detection unit, wherein the changes in the electrical property of the first and second form change detecting units being different when the deformation is added to the display device, and an input of a first data that depends on a direction of the deformation is enabled.

In the specification the term "deformation" includes form changes of at least "bending", "rounding", "turning over" and "torsion".

According to the invention, based on the completely different concept from the prior art, the display input device with which analog data input by easy and intuitive operation can be offered, and various display input system comprising the same can be also offered, and thus the merit on industry is great.

BRIEF DESCRIPTION OF THE DRAWINGS

The present invention will be understood more fully from the detailed description given herebelow and from the accompanying drawings of the embodiments of the invention. However, the drawings are not intended to imply limitation of the invention to a specific embodiment, but are for explanation and understanding only.

In the drawings;

FIG. **1** is a conceptual diagram showing the display input system according of the embodiment of the invention;

FIGS. **2**A and **2**B are schematic diagrams which illustrate the fundamental sectional structures of the display input devices of the embodiment;

FIG. **3** is a schematic diagram showing the principle for inputting data in an analog fashion in the embodiment;

FIG. **4** is a schematic diagram showing the case where the bending is added to the initial state **30**A to create the final state **30**C;

FIG. **5** is a schematic diagram showing a principle for distinguishing an input by the direction of the bending in the embodiment;

FIG. **6** is a conceptual diagram which illustrates the structure of the form change detection unit **30**;

FIGS. **7**A and **7**B arc schematic diagrams explaining a function of the perception layer **35** made of a resistance material;

FIG. **8** is graph which illustrates the response characteristic of a cell shown in FIGS. **7**A and **7**B;

FIGS. **9**A through **9**C arc conceptual diagrams explaining the states where bending is added to a form change detection unit **30**;

FIG. **10** is a schematic diagram which illustrates the circuit structure of the form change detection unit **30**;

FIG. **11** is a schematic diagram which illustrates another circuit structure of the form change detection unit **30**;

FIG. **12** is a schematic diagram showing another structure of the form change detection unit **30**;

FIG. **13** is a schematic diagram which shows a structure where the form change detection unit **30** is divided;

FIGS. **14**A and **14**B are also schematic diagrams showing the display input devices where the form change detection units **30** are divided;

FIG. **15** is a schematic diagram which illustrates the display input device with which two or more form change detection units are laminated;

FIG. **16** shows the structure where the analog signal outputs AS**1** and AS**2** can be taken out from these form change detection units **30**A and **30**B, respectively;

FIG. **17** shows the structure where signal processing of the analog signal outputs AS**1** and AS**2** in a processing part SP is carried out, and an analog output AS and a digital output DS are obtained;

FIG. **18** is a schematic sectional diagram showing an example of a laminated type display input device;

FIG. **19** shows the structure where analog signal outputs AS**1** and AS**2** obtained from each of form change detection units **30**A and **30**B can be processed, and an analog output AS and a digital output SD can be obtained;

FIG. **20** is a schematic diagram showing a display input device of the example of the invention combined with a touch panel;

FIG. **21** shows that the outputs can be separately used;

FIG. **22** shows that a digital output DS from a touch panel **50** and an analog output AS**1** from a form change detection unit **30** can be processed, and an analog output AS**2** can also be obtained;

FIGS. **23**A through **25**C are process sectional views showing the principal parts of the manufacturing process of the liquid crystal display used in this example;

FIG. **26** is a schematic diagram showing the cross-sectional structure of the display input device of the example;

FIG. **27** is a schematic diagram showing the plane arrangement relation of the principal part;

FIG. **28** is a block diagram of the display input system of the fifth example of the invention;

FIG. **29** shows an outline view of the display input system;

FIG. **30** shows that a user **200** holds the right-hand side of the display unit **20** (that is, display input system) with the right hand, adds bending to left-hand side to turn over a page;

FIG. **31** shows that the user **200** holds the left-hand side of the display unit **20** (that is, display input system), adds bending to right-hand side to turn over a page

FIG. **32**A shows the operation which rolls round the display unit **20**;

FIG. **32**B shows the operation which folds the display unit **20**;

FIG. **33** shows that the upper left portion of the above-mentioned display unit **20** is turned over just for a moment by adding the bending;

FIG. **34** shows that it is possible to perform a handwriting input using a pen;

FIG. **35** shows that operation which gathers and shakes a part of display unit **20** (that is, display input system) is carried out;

FIG. **36** shows the display unit **20** having a flex auxiliary part **400**;

FIG. **37** shows the whole display input system structure of the sixth example of the invention;

FIG. **38** shows that the user carries out the turning-over operation;

FIG. **39** shows the structure of the display input system of the seventh example of the invention;

FIG. **40** is an outline view of the display input system concerning the example;

FIG. **41** shows that the page turning over is performed by bringing the paper to the bottom;

FIG. **42** is the whole display input system structure figure concerning the example;

FIG. **43**A shows that the lower part of the display unit **20** is used for position presentation part **804**;

FIG. **43**B shows that the image of accumulation of paper is displayed on the left-hand side of the display unit **20**;